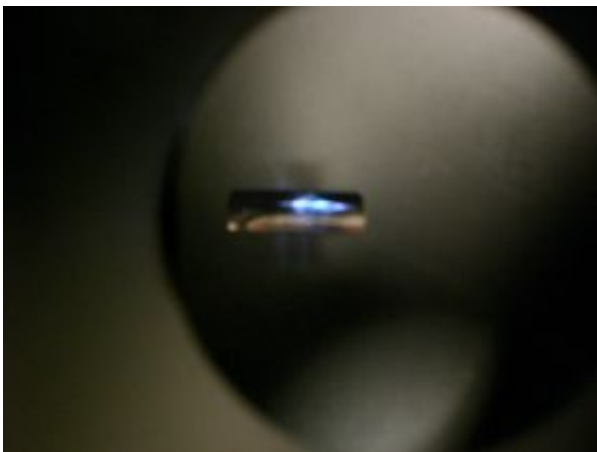


SSRL Beamline 13 Achieves First Light

February 29 2008



Light shines into Beamline 13.

On February 14, the first light shone into the Stanford Synchrotron Radiation Laboratory's newest beamline. Beamline 13, which has been under construction for the past two years, will allow new types of soft X-ray material science studies at SSRL.

"Beamline 13 is especially exciting because it has an elliptical polarizing undulator," said Beamline Development Engineer Michael Rowen, who has been working on this project for nearly five years. "With this new tool we can learn more about the magnetic properties of materials and the nature and orientation of chemical bonds."

When finished, the Department of Energy-funded beamline will be configured with three experimental stations: Beamline 13-1 for scanning

transmission X-ray microscopy, which will allow the study of condensed matter and surface science and magnetism at the nanometer scale; Beamline 13-2 for photoemission and X-ray absorption spectroscopy, which shows the angles and lengths of bonds both inside materials and at their surfaces; and Beamline 13-3 for resonant coherent scattering and diffraction imaging experiments, which can reveal structure at the nanometer scale.

Commissioning experiments on Beamline 13-2 and Beamline 13-3 are expected to begin later this spring, with commissioning on Beamline 13-1 in the fall of 2008. User experiments on these new experimental stations will commence during the 2009 user run.

Source: SLAC, by Kelen Tuttle

Citation: SSRL Beamline 13 Achieves First Light (2008, February 29) retrieved 1 May 2024 from <https://phys.org/news/2008-02-ssrl-beamline.html>

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